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Zilka-Kotab, PC P.O. BOX 721120 SAN JOSE, CA 95172-1120			BLACKWELL, JAMES H	
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**BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES**

Application Number: 10/075,722  
Filing Date: February 14, 2002  
Appellant(s): JAGGER ET AL.

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Dominic M. Kotab  
For Appellant

**EXAMINER'S ANSWER**

This is in response to the brief on appeal filed 04/20/2006 appealing from the  
Office action mailed 10/03/2005.

**(1) Real Party in Interest**

A statement identifying by name the real party in interest is contained in the brief.

**(2) Related Appeals and Interferences**

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

**(3) Status of Claims**

The statement of the status of claims contained in the brief is correct.

**(4) Status of Amendments After Final**

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

**(5) Summary of Claimed Subject Matter**

The summary of claimed subject matter contained in the brief is correct.

**(6) Grounds of Rejection to be Reviewed on Appeal**

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

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**(7) Claims Appendix**

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(8) Evidence Relied Upon**

6842773

Ralston et al.

1-2005

**(9) Grounds of Rejection**

The following ground(s) of rejection are applicable to the appealed claims:

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-3, 5, 8-15, 17-18, 20, and 24 are rejected under 35 U.S.C. 102(b) as being anticipated by Ralston et al. (hereinafter Ralston, U.S. Patent No. 6,842,773).

**In regard to independent Claim 1 (and similarly independent claims 13, and 18), Ralston teaches a process for generating a signature (checksum) of an email based only on the body of the message (the phrase body of the message is interpreted as that part of the message that contains the actual message). The process begins in step 704 where an e-mail message (400) is retrieved. The received email message is**

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“filtered” to remove the *headers* or other so-called hidden information (e.g., *end-of-line characters, control characters, etc.*) *leaving behind the visible body (408) of the message (400) in step 708*. Generally, the motivation behind removing such information is to avoid confusion in further processing of the message (Col. 14, lines 10-20). Such future processing can involve comparing a “fingerprint” of the message to a database of known unsolicited email fingerprints (Col. 13, lines 7-14).

Ralston also teaches that an email message can be broken down by finding one or more anchors in the visible text portions of the body of the email (Col. 6, lines 2-3). Such anchors are then treated as representative of the particular email and are then compared with a database for possible identification as being unsolicited (Col. 6, lines 4-16). It is noted that Ralston both performs a certain amount of filtering of the email message and also only generates anchors (checksums) from within the body of the email message (excluding headers, footers, and other characters or non-characters that would be detrimental to the determination of whether the email is solicited or unsolicited). It is further noted that regardless of whether or not components, most notably the headers, are physically removed or are not included in the generation of a checksum or other identifier that the result is the same. Namely, the exclusion of components that would act as a source of potential confusion in the identification of unsolicited email. Thus, Ralston teaches *generating a checksum based on data remaining within the electronic mail message and comparing the generated checksum with a database containing checksums for previously identified unsolicited messages*.

Ralston also teaches *identifying the electronic message as an unsolicited message if the generated checksum matches one of the database checksums* (e.g., Col. 5, lines 52-65).

Ralston also teaches that an unsolicited mailer is a party that sends email indiscriminately to thousands and possibly millions of unsuspecting users in a short period of time (Col. 3, lines 22-31). It is well known in the art that another term used to describe such parties is spammers.

**In regard to dependent Claim 2 (and similarly dependent Claims 3, 14-15, and 20), Ralston teaches a number of different scenarios for generating “fingerprints” or codes, or exemplars on the visible body of the email (e.g., Figs. 7a-d). In each case, individual checksums or fingerprints are identified (anchors) and generated (Col. 6, lines 2-17; Col. 12, lines 63-67; Col. 13-14; Col. 15, lines 1-28). Thus, Ralston teaches *generating a checksum comprises generating individual checksums for portions of the remaining data.***

**In regard to dependent Claim 5, Ralston teaches *removing forwarding information* in that the received email message is “filtered” to remove the *headers* or other so-called hidden information (e.g., *end-of-line characters, control characters, etc.*) *leaving behind the visible body (408) of the message (400) in step 708*. Generally, the motivation behind removing such information is to avoid confusion in further processing**

of the message (Col. 14, lines 10-20). It is noted that such forwarding information is typically contained in the headers of the email message, which is removed.

**In regard to dependent Claim 8, Ralston teaches *deleting the electronic mail message if the message is identified as an unsolicited message* in that electronic mail messages that are found to be bulk electronic mail messages are removed or discarded from the solicited email folder into a suspected bulk email folder (see Figs. 5a-f).**

**In regard to dependent Claim 9, Ralston teaches *at least temporarily storing the electronic message if the message is identified as an unsolicited message* (Figs. 5a-f, suspect emails are stored in bulk email folders).**

**In regard to dependent Claim 10, Ralston teaches *forwarding the electronic message to an intended recipient if the message is not identified as an unsolicited message* (see Figs. 5a-f, if not suspected as being unsolicited, email is placed into inbox and sorted).**

**In regard to dependent Claim 11, Ralston teaches *updating the database with new checksums* in that the message database (206) stores fingerprints for messages received by the mail system (112). Acting as a server, the message database (206) provides fingerprint information to the mail transfer agent (204) during processing of an e-mail message. Each message is processed to generate a fingerprint representative of**

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the message. If a fingerprint matches one in the message database (206), the message may be sorted into the bulk mail folder of the user. *Any message unique to the mail system has its fingerprint stored in the message database (206) to allow for matching to subsequent messages.* In this way, patterns can be uncovered in the messages received by the mail system (112).

**In regard to dependent Claims 12, and 17,** Claims 12, and 17 contain similar subject matter as that found in Claim 11, and are rejected along similar lines of reasoning.

**In regard to dependent Claim 22,** Ralston does not explicitly teach that *the forwarding information includes a ">" character*. However, it is notoriously well known to one of ordinary skill in the art of electronic mail to know that forwarded information is commonly designated by prefixing each line with a right caret (">") character.

**In regard to dependent Claim 24,** Claim 24 contains similar subject matter to that found in Claim 1 (and similarly Claims 13, and 18), and is rejected along the same rationale.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:



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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 4, 16, 19, and 21-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ralston.

**In regard to dependent Claim 4 (and similarly dependent Claims 16, 21, and 23), Ralston** fails to teach *comparing a checksum comprises comparing checksums starting with one of the portions at the end of the remaining data and working backwards through the data*. However, it is notoriously well known in the art to make comparisons between items in any order. Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to compare checksums in either direction (top to bottom, or bottom to top) providing the benefit of identifying unsolicited emails.

**In regard to dependent Claim 19, Ralston** does not explicitly teach that *the computer readable medium is selected from the group consisting of CD-ROM, floppy disk, tape, flash memory, system memory, and hard drive*. However, Ralston does teach the use of a number of databases, implying the use of one or more of the storage media claimed. Thus, it would have been obvious to one of ordinary skill in the art at the time of invention to conclude that Ralston would have made use of one or more of the claimed computer readable media, providing the benefit of storing fingerprints of email messages.

**(10) Response to Argument**

Appellant argues in section VII (pages 9-13 of Appellant's Appeal Brief (hereinafter the Brief)) the following issues (labeled as Issues #1 and #2), which are accordingly addressed below:

The following arguments are with respect to claims 1, 2, 8-10, 13-14, 17, 18 and 20 (labeled as Issue #1, Group #1 by Appellant).

a. Appellant asserts that item 708 in Fig. 7A of Ralston does not teach the limitation found in Claim 1 (similar language in each of the independent claims) of, "removing non-static data including visible end-of-line characters and headers, from the electronic mail message" (page 9, under label issue #1 of Brief).

The Examiner respectfully disagrees. Item 708 of Fig. 7A of Ralston teaches stripping (removing) headers and hidden information to leave visible text body of message. The overall goal of both the Appellants claim limitation and of Ralston is to strip (remove) anything from an email message that would serve to complicate any subsequently generated fingerprints (checksums). It is noted by the Examiner that it is typical of electronic documents, including emails to contain end-of-line control codes such as carriage controls and line feeds which are usually not visible when a user views the document with a word processor or email client. However, many of such document editors and viewers (e.g. Microsoft Word®, WordPerfect®) offer the option to make visible such end-of-line control characters by selecting, in the case of MS Word, a switch to view all formatting marks (usually indicated by a ¶ symbol in a toolbar). This

reveals and makes visible all of the normally hidden end-of-line characters, including carriage control and line feeds in the document. Whether or not such end-of-line content is visible, or made visible seems irrelevant to the Examiner. More important is the fact that such characters and character sequences need to be removed to avoid confusion and inconsistencies in the creation of fingerprints (checksums), which Ralston teaches and the Appellant claims.

b. Appellant asserts that Ralston does not teach the limitation of Claim 1 (similar language in each of the independent claims) of, "wherein the non-static data is removed to prevent the non-static data from being subject to the checksum, so that non-static data forged by spammers does not compromise the identification of the electronic message as the unsolicited message" (page 10, 3<sup>rd</sup> paragraph). The Examiner disagrees and believes that Ralston does give an explanation of why such non-static data is removed. Col. 13, lines 5-6 of Ralston teach that such information is removed as to avoid potentially confusing processing of the message (item 400 Fig. 4). The Examiner interprets this statement as teaching that such data (hidden and headers) is removed so that processing of the message, including the generation of fingerprints (understood as a type of checksum) is made simpler and less subject to confusion. Thus, Ralston teaches this limitation of Appellant's Claim 1.

The following arguments are with respect to claims 3 and 15 (labeled as Issue #1, Group #2 by Appellant).

a. Appellant asserts that Ralston (Figs. 7A-D) does not teach the limitation of dependent claim 3 (and similarly claim 15) of "...wherein the portions comprise lines of data". The Examiner disagrees and argues that the limitation does not contain any definition of what constitutes a line of data. Examiner therefore asserts that Ralston's teaching of forming fingerprints for words (Figs. 7A-B) and groups of characters (Figs. 7C-D) are interpreted as forming lines of lengths depending on the number of characters in the word(s) or groups of characters>

The following arguments are with respect to claims 5 (labeled as Issue #1, Group #3 by Appellant).

a. Appellant asserts that Ralston (Figs. 5A-F) does not teach the limitation of Claim 5 of "deleting the electronic mail message if the message is identified as an unsolicited message". Ralston teaches moving (from normal viewing by the user) those email messages determined to be of bulk (unsolicited, spam) origin. The Examiner interprets this as effectively removing (deleting) such bulk email from the users normal inbox or other folders that it is desired by the user to contain only "approved" or legitimate emails.

The following arguments are with respect to claim 11 (labeled as Issue #1, Group #4 by Appellant).

a. Appellant asserts that Ralston does not teach the limitation of Claim 11 of “updating the database with new checksums” where such database contains “checksums for previously identified unsolicited messages”. The Examiner disagrees and argues that the act of adding new fingerprints to the message database (message database 206 stores fingerprints for messages received by the mail system 112) of fingerprints (step 682 of Fig. 6A), does in effect teach updating the message (database(s)) with new fingerprint (checksum) content. It is noted that Ralston defines the message database as a database for storing fingerprints for messages received by the mail system 112. Acting as a server, the message database 206 provides fingerprint information to the mail transfer agent 204 during processing of an e-mail message. Each message is processed to generate a fingerprint representative of the message ... If a fingerprint matches one in the message database 206, the message may be sorted into the bulk mail folder of the user. Any message unique to the mail system has its fingerprint stored in the message database 206 to allow for matching to subsequent messages. In this way, patterns can be uncovered in the messages received by the mail system 112 (Col. 5, lines 52-65). The implication is that the message database would have contained fingerprints of messages previously processed in order to act as a check for newly incoming messages to determine whether or not they contain fingerprints of unsolicited content.

The following arguments are with respect to claim 12 (labeled as Issue #1, Group #5 by Appellant).

a. Appellant asserts that Ralston does not teach the limitation of claim 12 of “wherein the database is updated based on checksums generated from electronic messages received and identified as an unsolicited message”. The Examiner disagrees and argues that the message database contains fingerprint(s) (checksums) for all of the messages received and therefore would contain those related to unsolicited content. The database would therefore also be regularly updated.

The following arguments are with respect to claim 24 (labeled as Issue #1, Group #6 by Appellant).

a. Ralston does not teach the limitation of claim 24 of “wherein the non-static data is removed prior to the checksum being generated”. The Examiner disagrees and, in addition to the arguments with respect to hidden content (Issue #1, Group 1) where Examiner concludes that hidden content can be made visible content, Ralston also teaches that headers and hidden information is removed prior to attempting to identify the message as being unsolicited (Figs. 7A-D).

The following arguments are with respect to claims 4, 16, 21, and 23 (labeled as Issue #2, Group #1 by Appellant).

a. The Appellant asserts that Ralston does not teach the limitation of Claim 4 (and similarly Claims 16, 21, and 23) of “wherein comparing a checksum comprises comparing checksums starting with one of the portions at the end of the remaining data and working backwards through the data”. The Examiner disagrees and argues that an example where a user can check a document either from top to bottom or from bottom to top can be found in the act of searching for text in applications such as Microsoft Internet Explorer® where the user can choose to begin searching either in forward or reverse order (seen in dialog box invoked by simultaneously depressing the Control and F keys and choosing either forward or backward buttons).

The following arguments are with respect to claim 19 (labeled as Issue #2, Group #2 by Appellant).

a. Appellant asserts that Ralston does not teach the limitation of Claim 19 “wherein the computer readable medium is selected from the group consisting of CD-ROM, floppy disk, tape, flash memory, system memory, and hard drive”. The Examiner disagrees. Ralston at least suggests this limitation in that Ralston does teach the use of a number of databases, implying the use of one or more of the storage media claimed.

The following arguments are with respect to claim 22 (labeled as Issue #2, Group #3 by Appellant).

a. Appellant asserts that Ralston fails to teach the limitation "wherein the forwarding information includes a > character". The Examiner disagrees and offers as an example Microsoft Outlook<sup>®</sup> wherein the user can designate (under Email Options in the Options Dialog box) that forwarded emails contain the original message. That original message is indicated with a right caret ">" character to differentiate it from any new content.



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**(11) Related Proceeding(s) Appendix**

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

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